

*West Virginia Department of Environmental Protection*

*Bob Wise*  
*Governor*

*Division of Air Quality*

*Stephanie R. Timmermeyer*  
*Cabinet Secretary*

# Permit to Operate



Pursuant to  
**Title V**  
of the Clean Air Act

*Issued to:*

**Northwest Fuel Development, Inc.**  
**Federal No. 2 Mine – Parrish Shaft, Monangalia County, WV**  
**R30-06100116-2004**

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*John A. Benedict*  
*Director*

Issued: **August 31, 2004** • Effective: **September 14, 2004**  
Expiration: **August 31, 2009** • Renewal: **February 28, 2009**

Permit Number: **R30-06100116-2004**  
Permittee: **Northwest Fuel Development, Inc.**  
Facility Name: **Federal No. 2 Mine – Parrish Shaft**  
Mailing Address: **4064 Orchard Drive, Lake Oswego, OR 97035**

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*This permit is issued in accordance with the West Virginia Air Pollution Control Act (West Virginia Code §§ 22-5-1 et seq.) and 45CSR30 — Requirements for Operating Permits. The permittee identified at the above-referenced facility is authorized to operate the stationary sources of air pollutants identified herein in accordance with all terms and conditions of this permit.*

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|                          |   |
|--------------------------|---|
| Facility Location:       | Crossroads, Monongalia County, West Virginia  |
| Mailing Address:         | Federal No. 2 Mine – Parrish Shaft, County Road 13, Crossroads, WV<br>26590   |
| Telephone Number:        | (304) 662-6584  |
| Type of Business Entity: | Corporation   |
| Facility Description:    | A waste methane gas fueled electrical generation facility consisting of eighteen (18) 454 CID Chevrolet engines each connected directly to a 75 kW, 460 volt, 3-phase electric generator. |
| SIC Codes:               | 1311 Primary; None Secondary; None Tertiary)  |
| UTM Coordinates:         | 559.28 (km) Easting • 4389.24 (km) Northing • Zone 17   |

*Any person whose interest may be affected, including, but not necessarily limited to, the applicant and any person who participated in the public comment process, by a permit issued, modified or denied by the Secretary may appeal such action of the Secretary to the Air Quality Board pursuant to article one [§§ 22B-1-1 et seq.], Chapter 22B of the Code of West Virginia. West Virginia Code §22-5-14.*

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*Issuance of this Title V Operating Permit does not supersede or invalidate any existing permits under 45CSR13, 14 or 19, although all applicable requirements from such permits governing the facility's operation and compliance have been incorporated into the Title V Operating Permit.*

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## 1.0. Emission Units

| Emission Unit ID  | Emission Point ID | Emission Unit Description   | Year Installed | Design Capacity   | Control Device |
|---|-------------------|---|----------------|---|----------------|
| Internal Combustion Engines   |                   |   |                |   |                |
| 001-01 (N1),<br>001-0J (N2),<br>001-0K (N3),<br>001-0L (N4),<br>001-0M (N5),<br>001-0N (N6),<br>001-07 (N7),<br>001-08 (N8),<br>001-09 (N9),<br>001-0A (N10),<br>001-0B (N11),<br>001-0C (N12),<br>001-0D (N13),<br>001-0E (N14),<br>001-0F (N15),<br>001-0G (N16),<br>001-0H (N17),<br>and<br>001-0I (N18) | S-1 (Stack)       | 18 - Internal Combustion Engines (ICE) -Turbines Connected to 75 kW, 460 Volt, 3-Phase Electric Generator | 7/15/2002      | 1.40 MMBtu per hour-heat Heat Input of Waste per each ICE | None           |
|   |                   | Manufacturer: Chevrolet   |                | 18 - 454 in <sup>3</sup> Engines                          |                |
|   |                   | Model No.: 454 CID  |                |   |                |
|   |                   | Serial No.: Numerous  |                | Methane is 650 Btu  |                |
|   |                   | Fuel: 1,215 scf/hr of Waste Methane Gas Vented from the Federal No.2 Mine – Vents 20 and 30               |                |   |                |
|   |                   | Waste Methane Gas Btu: 650 Btu / scf  |                |   |                |
| Diethanol Amine and Triethylene Glycol Dehydration Units  |                   |   |                |   |                |
| TEG   | TEG Stack         | Triethylene Glycol Dehydration (TEG) Unit   | 9/1/2002       | 0.2851 mcf/d at 30 psig                                   | None           |
|   |                   | Manufacturer: Oakwood Energy 2/3 GPM TEG Unit   |                | Reboiler Fuel Usage 0.125 MMBtu/hr                        |                |
|   |                   | Model No.: NA   |                |   |                |
|   |                   | Serial No.: NA  |                |   |                |
|   |                   | Feed: Waste Methane Gas Vented from the Federal No.2 Mine - Vents 20 and 30                               |                |   |                |
| DEA   | DEA Stack         | Diethanolamine (DEA) Unit   | 9/1/2002       | 0.300 mscfd (Dry Basis) at 20 psig                        | None           |
|   |                   | Manufacturer: Latoka 7.5GPM DEA Unit  |                | Reboiler Fuel Usage 0.600 MMBtu/hr                        |                |
|   |                   | Model No.: NA   |                |   |                |
|   |                   | Serial No.: NA  |                |   |                |
|   |                   | Fuel: Waste Methane Gas Vented from the Federal No.2 Mine - Vents 20 and 30                               |                |   |                |

## 2.0. General Conditions

### 2.1. Definitions

- 2.1.1. All references to the "West Virginia Air Pollution Control Act" or the "Air Pollution Control Act" mean those provisions contained in W.Va. Code §§ 22-5-1 to 22-5-18.
- 2.1.2. The "Clean Air Act" means those provisions contained in 42 U.S.C. §§ 7401 to 7671q, and regulations promulgated thereunder.
- 2.1.3. "Secretary" means the Secretary of the Department of Environmental Protection or such other person to whom the Secretary has delegated authority or duties pursuant to W.Va. Code §§ 22-1-6 or 22-1-8 (45CSR§30-2.12.). The Director of the Division of Air Quality is the Secretary's designated representative for the purposes of this permit.

### 2.2. Acronyms

|                             |   |                        |   |
|-----------------------------|---|------------------------|---|
| <b>CAAA</b>                 | Clean Air Act Amendments                                  | <b>NSPS</b>            | New Source                                    |
| <b>CBI</b>                  | Confidential Business Information                         |                        | Performance Standards                         |
| <b>CEM</b>                  | Continuous Emission Monitor                               | <b>PM</b>              | Particulate Matter                            |
| <b>CES</b>                  | Certified Emission Statement                              | <b>PM<sub>10</sub></b> | Particulate Matter less than 10µm in diameter |
| <b>C.F.R. or CFR</b>        | Code of Federal Regulations                               |                        |   |
| <b>CO</b>                   | Carbon Monoxide   | <b>pph</b>             | Pounds per Hour                               |
| <b>C.S.R. or CSR</b>        | Codes of State Rules                                      | <b>ppm</b>             | Parts per Million                             |
| <b>DAQ</b>                  | Division of Air Quality                                   | <b>PSD</b>             | Prevention of Significant Deterioration       |
| <b>DEP</b>                  | Department of Environmental Protection                    | <b>psi</b>             | Pounds per Square Inch                        |
| <b>FOIA</b>                 | Freedom of Information Act                                | <b>SIC</b>             | Standard Industrial Classification            |
| <b>HAP</b>                  | Hazardous Air Pollutant                                   |                        |   |
| <b>HON</b>                  | Hazardous Organic NESHAP                                  | <b>SIP</b>             | State Implementation Plan                     |
| <b>HP</b>                   | Horsepower  |                        |   |
| <b>lbs/hr or lb/hr</b>      | Pounds per Hour   | <b>SO<sub>2</sub></b>  | Sulfur Dioxide                                |
| <b>LDAR</b>                 | Leak Detection and Repair                                 | <b>TAP</b>             | Toxic Air Pollutant                           |
| <b>M</b>                    | Thousand  | <b>TPY</b>             | Tons per Year                                 |
| <b>MACT</b>                 | Maximum Achievable Control Technology                     | <b>TRS</b>             | Total Reduced Sulfur                          |
|                             |   | <b>TSP</b>             | Total Suspended Particulate                   |
| <b>MM</b>                   | Million   |                        |   |
| <b>MMBtu/hr or mmbtu/hr</b> | Million British Thermal Units per Hour                    | <b>USEPA</b>           | United States Environmental Protection Agency |
| <b>MMCF/hr or mmcf/hr</b>   | Million Cubic Feet Burned per Hour                        | <b>UTM</b>             | Universal Transverse Mercator                 |
| <b>NA</b>                   | Not Applicable  |                        |   |
| <b>NAAQS</b>                | National Ambient Air Quality Standards                    | <b>VEE</b>             | Visual Emissions Evaluation                   |
| <b>NESHAPS</b>              | National Emissions Standards for Hazardous Air Pollutants | <b>VOC</b>             | Volatile Organic Compounds                    |
| <b>NO<sub>x</sub></b>       | Nitrogen Oxides   |                        |   |

## **2.3. Permit Expiration and Renewal**

- 2.3.1. Permit duration. This permit is issued for a fixed term of five (5) years and shall expire on the date specified on the cover of this permit, except as provided in 45CSR§30-6.3.b. and 45CSR§30-6.3.c. [45CSR§30-5.1.b.]
- 2.3.2. A permit renewal application is timely if it is submitted at least six (6) months prior to the date of permit expiration. [45CSR§30-4.1.a.3.]
- 2.3.3. Permit expiration terminates the source's right to operate unless a timely and complete renewal application has been submitted consistent with 45CSR§30-6.2. and 45CSR§30-4.1.a.3. [45CSR§30-6.3.b.]
- 2.3.4. If the Secretary fails to take final action to deny or approve a timely and complete permit application before the end of the term of the previous permit, the permit shall not expire until the renewal permit has been issued or denied, and any permit shield granted for the permit shall continue in effect during that time. [45CSR§30-6.3.c.]

## **2.4. Permit Actions**

- 2.4.1. This permit may be modified, revoked, reopened and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any permit condition. [45CSR§30-5.1.f.3.]

## **2.5. Reopening for Cause**

- 2.5.1. This permit shall be reopened and revised under any of the following circumstances:
  - a. Additional applicable requirements under the Clean Air Act or the Secretary's legislative rules become applicable to a major source with a remaining permit term of three (3) or more years. Such a reopening shall be completed not later than eighteen (18) months after promulgation of the applicable requirement. No such reopening is required if the effective date of the requirement is later than the date on which the permit is due to expire, unless the original permit or any of its terms and conditions has been extended pursuant to 45CSR§§30-6.6.a.1.A. or B.
  - b. Additional requirements (including excess emissions requirements) become applicable to an affected source under Title IV of the Clean Air Act (Acid Deposition Control) or other legislative rules of the Secretary. Upon approval by U.S. EPA, excess emissions offset plans shall be incorporated into the permit.
  - c. The Secretary or U.S. EPA determines that the permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the permit.

- d. The Secretary or U.S. EPA determines that the permit must be revised or revoked and reissued to assure compliance with the applicable requirements.

[45CSR§30-6.6.a.]

## **2.6. Administrative Permit Amendments**

- 2.6.1. The permittee may request an administrative permit amendment as defined in and according to the procedures specified in 45CSR§30-6.4.

[45CSR§30-6.4.]

## **2.7. Minor Permit Modifications**

- 2.7.1. The permittee may request a minor permit modification as defined in and according to the procedures specified in 45CSR§30-6.5.a.

[45CSR§30-6.5.a.]

## **2.8. Significant Permit Modification**

- 2.8.1. The permittee may request a significant permit modification, in accordance with 45CSR§30-6.5.b., for permit modifications that do not qualify for minor permit modifications or as administrative amendments.

[45CSR§30-6.5.b.]

## **2.9. Emissions Trading**

- 2.9.1. No permit revision shall be required, under any approved economic incentives, marketable permits, emissions trading, and other similar programs or processes for changes that are provided for in the permit and that are in accordance with all applicable requirements.

[45CSR§30-5.1.h.]

## **2.10. Off-Permit Changes**

- 2.10.1. Except as provided below, a facility may make any change in its operations or emissions that is not addressed nor prohibited in its permit and which is not considered to be construction nor modification under any rule promulgated by the Secretary without obtaining an amendment or modification of its permit. Such changes shall be subject to the following requirements and restrictions:

- a. The change must meet all applicable requirements and may not violate any existing permit term or condition.
- b. The permittee must provide a written notice of the change to the Secretary and to U.S. EPA within two (2) business days following the date of the change. Such written notice shall describe each such change, including the date, any change in emissions, pollutants emitted, and any applicable requirement that would apply as a result of the change.
- c. The change shall not qualify for the permit shield.



- d. The permittee shall keep records describing all changes made at the source that result in emissions of regulated air pollutants, but not otherwise regulated under the permit, and the emissions resulting from those changes.
- e. No permittee may make any change subject to any requirement under Title IV of the Clean Air Act (Acid Deposition Control) pursuant to the provisions of 45CSR§30-5.9.
- f. No permittee may make any changes which would require preconstruction review under any provision of Title I of the Clean Air Act (including 45CSR14 and 45CSR19) pursuant to the provisions of 45CSR§30-5.9.

**[45CSR§30-5.9.]**

**2.11. Operational Flexibility**

- 2.11.1. The permittee may make changes within the facility as provided by § 502(b)(10) of the Clean Air Act. Such operational flexibility shall be provided in the permit in conformance with the permit application and applicable requirements. No such changes shall be a modification under any rule or any provision of Title I of the Clean Air Act (including 45CSR14 and 45CSR19) promulgated by the Secretary in accordance with Title I of the Clean Air Act and the change shall not result in a level of emissions exceeding the emissions allowable under the permit.

**[45CSR§30-5.8]**

- 2.11.2. Before making a change under 45CSR§30-5.8., the permittee shall provide advance written notice to the Secretary and to U.S. EPA, describing the change to be made, the date on which the change will occur, any changes in emissions, and any permit terms and conditions that are affected. The permittee shall thereafter maintain a copy of the notice with the permit, and the Secretary shall place a copy with the permit in the public file. The written notice shall be provided to the Secretary and U.S. EPA at least seven (7) days prior to the date that the change is to be made, except that this period may be shortened or eliminated as necessary for a change that must be implemented more quickly to address unanticipated conditions posing a significant health, safety, or environmental hazard. If less than seven (7) days notice is provided because of a need to respond more quickly to such unanticipated conditions, the permittee shall provide notice to the Secretary and U.S. EPA as soon as possible after learning of the need to make the change.

**[45CSR§30-5.8.a.]**

- 2.11.3. The permit shield shall not apply to changes made under 45CSR§30-5.8., except those provided for in 45CSR§30-5.8.d. However, the protection of the permit shield will continue to apply to operations and emissions that are not affected by the change, provided that the permittee complies with the terms and conditions of the permit applicable to such operations and emissions. The permit shield may be reinstated for emissions and operations affected by the change:

- a. If subsequent changes cause the facility's operations and emissions to revert to those authorized in the permit and the permittee resumes compliance with the terms and conditions of the permit, or
- b. If the permittee obtains final approval of a significant modification to the permit to incorporate the change in the permit.

**[45CSR§30-5.8.c.]**

- 2.11.4. "Section 502(b)(10) changes" are changes that contravene an express permit term. Such changes do not include changes that would violate applicable requirements or contravene enforceable permit terms and conditions that are monitoring (including test methods), recordkeeping, reporting, or compliance certification requirements.

[45CSR§30-2.39]

## **2.12. Reasonably Anticipated Operating Scenarios**

- 2.12.1. The following are terms and conditions for reasonably anticipated operating scenarios identified in this permit.

- a. Contemporaneously with making a change from one operating scenario to another, the permittee shall record in a log at the permitted facility a record of the scenario under which it is operating and to document the change in reports submitted pursuant to the terms of this permit and 45CSR30.
- b. The permit shield shall extend to all terms and conditions under each such operating scenario; and
- c. The terms and conditions of each such alternative scenario shall meet all applicable requirements and the requirements of 45CSR30.

[45CSR§30-5.1.i.]

## **2.13. Duty to Comply**

- 2.13.1. The permittee must comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the West Virginia Code and the Clean Air Act and is grounds for enforcement action by the Secretary or USEPA; for permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application.

[45CSR§30-5.1.f.1.]

## **2.14. Inspection and Entry**

- 2.14.1. The permittee shall allow any authorized representative of the Secretary, upon the presentation of credentials and other documents as may be required by law, to perform the following:

- a. At all reasonable times (including all times in which the facility is in operation) enter upon the permittee's premises where a source is located or emissions related activity is conducted, or where records must be kept under the conditions of this permit;
- b. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
- c. Inspect at reasonable times (including all times in which the facility is in operation) any facilities, equipment (including monitoring and air pollution Control equipment), practices, or operations regulated or required under the permit;

- d. Sample or monitor at reasonable times substances or parameters to determine compliance with the permit or applicable requirements or ascertain the amounts and types of air pollutants discharged.

[45CSR§30-5.3.b.]

## **2.15. Schedule of Compliance**

- 2.15.1. For sources subject to a compliance schedule, certified progress reports shall be submitted consistent with the applicable schedule of compliance set forth in this permit and 45CSR§30-4.3.h., but at least every six (6) months, and no greater than once a month, and shall include the following:

- a. Dates for achieving the activities, milestones, or compliance required in the schedule of compliance, and dates when such activities, milestones or compliance were achieved; and
- b. An explanation of why any dates in the schedule of compliance were not or will not be met, and any preventative or corrective measure adopted.

[45CSR§30-5.3.d.]

## **2.16. Need to Halt or Reduce Activity not a Defense**

- 2.16.1. It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. However, nothing in this paragraph shall be construed as precluding consideration of a need to halt or reduce activity as a mitigating factor in determining penalties for noncompliance if the health, safety, or environmental impacts of halting or reducing operations would be more serious than the impacts of continued operations.

[45CSR§30-5.1.f.2.]

## **2.17. Emergency**

- 2.17.1. An "emergency" means any situation arising from sudden and reasonably unforeseeable events beyond the control of the source, including acts of God, which situation requires immediate corrective action to restore normal operation, and that causes the source to exceed a technology-based emission limitation under the permit, due to unavoidable increases in emissions attributable to the emergency. An emergency shall not include noncompliance to the extent caused by improperly designed equipment, lack of preventative maintenance, careless or improper operation, or operator error.

[45CSR§30-5.7.a.]

- 2.17.2. Effect of any emergency. An emergency constitutes an affirmative defense to an action brought for noncompliance with such technology-based emission limitations if the conditions of Section 2.17.3. [45CSR§30-5.7.c.] are met.

[45CSR§30-5.7.b.]

- 2.17.3. The affirmative defense of emergency shall be demonstrated through properly signed, contemporaneous operating logs, or other relevant evidence that:

- a. An emergency occurred and that the permittee can identify the cause(s) of the emergency;

- b. The permitted facility was at the time being properly operated;
- c. During the period of the emergency the permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards, or other requirements in the permit; and
- d. Subject to the requirements of 45CSR§30-5.1.c.3.C.1, the permittee submitted notice of the emergency to the Secretary within one (1) working day of the time when emission limitations were exceeded due to the emergency and made a request for variance, and as applicable rules provide. This notice, report, and variance request fulfills the requirement of 45CSR§30-5.1.c.3.B. This notice must contain a detailed description of the emergency, any steps taken to mitigate emissions, and corrective actions taken.

**[45CSR§30-5.7.c.]**

- 2.17.4. In any enforcement proceeding, the permittee seeking to establish the occurrence of an emergency has the burden of proof.

**[45CSR§30-5.7.d.]**

- 2.17.5. This provision is in addition to any emergency or upset provision contained in any applicable requirement.

**[45CSR§30-5.7.e.]**

## **2.18. Federally-Enforceable Requirements**

- 2.18.1. All terms and conditions in this permit, including any provisions designed to limit a source's potential to emit and excepting those provisions that are specifically designated in the permit as "State-enforceable only", are enforceable by the Secretary, USEPA, and citizens under the Clean Air Act.

**[45CSR§30-5.2.a.]**

- 2.18.2. Those provisions specifically designated in the permit as "State-enforceable only" shall become "Federally-enforceable" requirements upon SIP approval by the USEPA.

## **2.19. Duty to Provide Information**

- 2.19.1. The permittee shall furnish to the Secretary within a reasonable time any information the Secretary may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating the permit or to determine compliance with the permit. Upon request, the permittee shall also furnish to the Secretary copies of records required to be kept by the permittee. For information claimed to be confidential, the permittee shall furnish such records to the Secretary along with a claim of confidentiality in accordance with 45CSR31. If confidential information is to be sent to USEPA, the permittee shall directly provide such information to USEPA along with a claim of confidentiality in accordance with 40 C.F.R. Part 2.

**[45CSR§30-5.1.f.5.]**

## **2.20. Duty to Supplement and Correct Information**

- 2.20.1. Upon becoming aware of a failure to submit any relevant facts or a submittal of incorrect information in any permit application, the permittee shall promptly submit to the Secretary such supplemental facts or corrected information.  
[45CSR§30-4.2.]

## **2.21. Permit Shield**

- 2.21.1. Compliance with the conditions of this permit shall be deemed compliance with any applicable requirements as of the date of permit issuance provided that such applicable requirements are included and are specifically identified in this permit or the Secretary has determined that other requirements specifically identified are not applicable to the source and this permit includes such a determination or a concise summary thereof.  
[45CSR§30-5.6.a.]

- 2.21.2. Nothing in this permit shall alter or affect the following:

- a. The liability of an owner or operator of a source for any violation of applicable requirements prior to or at the time of permit issuance; or
- b. The applicable requirements of the Code of West Virginia and Title IV of the Clean Air Act (Acid Deposition Control), consistent with § 408 (a) of the Clean Air Act.
- c. The authority of the Administrator of U.S. EPA to require information under § 114 of the Clean Air Act or to issue emergency orders under § 303 of the Clean Air Act.

[45CSR§30-5.6.c.]

## **2.22. Credible Evidence**

- 2.22.1. Nothing in this permit shall alter or affect the ability of any person to establish compliance with, or a violation of, any applicable requirement through the use of credible evidence to the extent authorized by law. Nothing in this permit shall be construed to waive any defenses otherwise available to the permittee including but not limited to any challenge to the credible evidence rule in the context of any future proceeding.  
[45CSR§30-5.3.e.3.B. and 45CSR38]

## **2.23. Severability**

- 2.23.1. The provisions of this permit are severable. If any provision of this permit, or the application of any provision of this permit to any circumstance is held invalid by a court of competent jurisdiction, the remaining permit terms and conditions or their application to other circumstances shall remain in full force and effect.  
[45CSR§30-5.1.e.]

## **2.24. Property Rights**

- 2.24.1. This permit does not convey any property rights of any sort or any exclusive privilege.  
[45CSR§30-5.1.f.4]

## **2.25. Acid Deposition Control**

2.25.1. Emissions shall not exceed any allowances that the source lawfully holds under Title IV of the Clean Air Act (Acid Deposition Control) or rules of the Secretary promulgated thereunder.

- a. No permit revision shall be required for increases in emissions that are authorized by allowances acquired pursuant to the acid deposition control program, provided that such increases do not require a permit revision under any other applicable requirement.
- b. No limit shall be placed on the number of allowances held by the source. The source may not, however, use allowances as a defense to noncompliance with any other applicable requirement.
- c. Any such allowance shall be accounted for according to the procedures established in rules promulgated under Title IV of the Clean Air Act.

**[45CSR§30-5.1.d.]**

2.25.2. Where applicable requirements of the Clean Air Act are more stringent than any applicable requirement of regulations promulgated under Title IV of the Clean Air Act (Acid Deposition Control), both provisions shall be incorporated into the permit and shall be enforceable by the Secretary and U. S. EPA.

**[45CSR§30-5.1.a.2.]**

### 3.0. Facility-Wide Requirements

#### 3.1. Limitations and Standards

- 3.1.1. **Open burning.** The open burning of refuse by any person, firm, corporation, association or public agency is prohibited except as noted in 45CSR§6-3.1.  
[45CSR§6-3.1.]
- 3.1.2. **Open burning exemptions.** The exemptions listed in 45CSR§6-3.1 are subject to the following stipulation: Upon notification by the Secretary, no person shall cause, suffer, allow or permit any form of open burning during existing or predicted periods of atmospheric stagnation. Notification shall be made by such means as the Secretary may deem necessary and feasible.  
[45CSR§6-3.2.]
- 3.1.3. **Asbestos.** The permittee is responsible for thoroughly inspecting the facility, or part of the facility, prior to commencement of demolition or renovation for the presence of asbestos and complying with 40 C.F.R. § 61.145, 40 C.F.R. § 61.148, and 40 C.F.R. § 61.150. The permittee must notify the Secretary at least ten (10) working days prior to the commencement of any asbestos removal on the forms prescribed by the Secretary if the permittee is subject to the notification requirements of 40 C.F.R. § 61.145(b)(3)(i). A copy of this notice is required to be sent to the USEPA, the Division of Waste Management and the Bureau for Public Health - Environmental Health.  
[40 C.F.R. 61]
- 3.1.4. **Odor.** No person shall cause, suffer, allow or permit the discharge of air pollutants which cause or contribute to an objectionable odor at any location occupied by the public.  
[45CSR§4-3.1 State-Enforceable only.]
- 3.1.5. **Permanent shutdown.** A source which has not operated at least 500 hours in one 12-month period within the previous five (5) year time period may be considered permanently shutdown, unless such source can provide to the Secretary, with reasonable specificity, information to the contrary. All permits may be modified or revoked and/or reapplication or application for new permits may be required for any source determined to be permanently shutdown.  
[45CSR§13-10.5]
- 3.1.6. **Standby plan for reducing emissions.** When requested by the Secretary, the permittee shall prepare standby plans for reducing the emissions of air pollutants in accordance with the objectives set forth in Tables I, II, and III of 45CSR11.  
[45CSR§11-5.2]
- 3.1.7. **Emission inventory.** The permittee is responsible for submitting, on an annual basis, an emission inventory in accordance with the submittal requirements of the Division of Air Quality. This report is to be submitted no later than July 1 of each year unless directed by DAQ.  
[W.Va. Code § 22-5-4(a)(14)]
- 3.1.8. **Ozone-depleting substances.** For those facilities performing maintenance, service, repair or disposal of appliances, the permittee shall comply with the standards for recycling and emissions reduction pursuant to 40 C.F.R. Part 82, Subpart F, except as provided for Motor Vehicle Air Conditioners (MVACs) in Subpart B:

- a. Persons opening appliances for maintenance, service, repair, or disposal must comply with the prohibitions and required practices pursuant to 40 C.F.R. §§ 82.154 and 82.156.
- b. Equipment used during the maintenance, service, repair, or disposal of appliances must comply with the standards for recycling and recovery equipment pursuant to 40 C.F.R. § 82.158.
- c. Persons performing maintenance, service, repair, or disposal of appliances must be certified by an approved technician certification program pursuant to 40 C.F.R. § 82.161.

**[40 C.F.R. 82, Subpart F]**

- 3.1.9. **Risk Management Plan.** Should this stationary source, as defined in 40 C.F.R. § 68.3, become subject to Part 68, then the owner or operator shall submit a risk management plan (RMP) by the date specified in 40 C.F.R. § 68.10 and shall certify compliance with the requirements of Part 68 as part of the annual compliance certification as required by 40 C.F.R. Part 70 or 71.

**[40 C.F.R. 68]**

**3.2. Monitoring Requirements**

- 3.2.1. None

**3.3. Test Requirements**

- 3.3.1. **Stack testing.** As per provisions set forth in this permit or as otherwise required by the Secretary, in accordance with the West Virginia Code, underlying regulations, permits and orders, the permittee shall conduct test(s) to determine compliance with the emission limitations set forth in this permit and/or established or set forth in underlying documents. The Secretary, or his duly authorized representative, may at his option witness or conduct such test(s). Should the Secretary exercise his option to conduct such test(s), the operator shall provide all necessary sampling connections and sampling ports to be located in such manner as the Secretary may require, power for test equipment and the required safety equipment, such as scaffolding, railings and ladders, to comply with generally accepted good safety practices. Such tests shall be conducted in accordance with the methods and procedures set forth in this permit or as otherwise approved or specified by the Secretary in accordance with the following:
- a. The Secretary may on a source-specific basis approve or specify additional testing or alternative testing to the test methods specified in the permit for demonstrating compliance with 40 C.F.R. Parts 60, 61, and 63, if applicable, in accordance with the Secretary's delegated authority and any established equivalency determination methods which are applicable. If a testing method is specified or approved which effectively replaces a test method specified in the permit, the permit will be revised in accordance with 45CSR§30-6.4. or 45CSR§30-6.5 as applicable.
  - b. The Secretary may on a source-specific basis approve or specify additional testing or alternative testing to the test methods specified in the permit for demonstrating compliance with applicable requirements which do not involve federal delegation. In specifying or approving such alternative testing to the test methods, the Secretary, to the extent possible, shall utilize the same equivalency criteria as would be used in approving such changes under Section 3.3.1.a. of this permit. If a testing method is specified or approved which effectively replaces a test method specified in the permit, the permit will be revised in accordance with 45CSR§30-6.4. or 45CSR§30-6.5 as applicable.



- c. All periodic tests to determine mass emission limits from or air pollutant concentrations in discharge stacks and such other tests as specified in this permit shall be conducted in accordance with an approved test protocol. Unless previously approved, such protocols shall be submitted to the Secretary in writing at least thirty (30) days prior to any testing and shall contain the information set forth by the Secretary. In addition, the permittee shall notify the Secretary at least fifteen (15) days prior to any testing so the Secretary may have the opportunity to observe such tests. This notification shall include the actual date and time during which the test will be conducted and, if appropriate, verification that the tests will fully conform to a referenced protocol previously approved by the Secretary.

[WV Code § 22-5-4(a)(15) and 45CSR13]

### 3.4. Recordkeeping Requirements

- 3.4.1. **Monitoring information.** The permittee shall keep records of monitoring information that include the following:
  - a. The date, place as defined in this permit and time of sampling or measurements;
  - b. The date(s) analyses were performed;
  - c. The company or entity that performed the analyses;
  - d. The analytical techniques or methods used;
  - e. The results of the analyses; and
  - f. The operating conditions existing at the time of sampling or measurement.

[45CSR§30-5.1.c.2.A.]

- 3.4.2. **Retention of records.** The permittee shall retain records of all required monitoring data and support information for a period of at least five (5) years from the date of monitoring sample, measurement, report, application, or record creation date. Support information includes all calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation, and copies of all reports required by the permit. Where appropriate, records may be maintained in computerized form in lieu of the above records.

[45CSR§30-5.1.c.2.B.]

- 3.4.3. **Odors.** For the purposes of 45CSR4, the permittee shall maintain a record of all odor complaints received. Such record shall contain an assessment of the validity of the complaints as well as any corrective actions taken.

[45CSR§30-5.1.c. State-Enforceable only.]

### 3.5. Reporting Requirements

- 3.5.1. **Responsible official.** Any application form, report, or compliance certification required by this permit to be submitted to the DAQ and/or USEPA shall contain a certification by the responsible official that states that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate and complete.  
[45CSR§§30-4.4. and 5.1.c.3.D.]
- 3.5.2. A permittee may request confidential treatment for the submission of reporting required under 45CSR§30-5.1.c.3. pursuant to the limitations and procedures of W.Va. Code § 22-5-10 and 45CSR31.  
[45CSR§30-5.1.c.3.E.]
- 3.5.3. All notices, requests, demands, submissions and other communications required or permitted to be made to the Secretary of DEP and/or USEPA shall be made in writing and shall be deemed to have been duly given when delivered by hand, or mailed first class with postage prepaid to the address(es) set forth below or to such other person or address as the Secretary of the Department of Environmental Protection may designate:

**If to the DAQ:**

Director  
WVDEP  
Division of Air Quality  
7012 MacCorkle Avenue, SE  
Charleston, WV 25304-2943  
  
Phone: 304/926-3727  
FAX: 304/926-3739

**If to the US EPA:**

Associate Director  
Office of Enforcement and Permits Review  
(3AP12)  
U. S. Environmental Protection Agency  
Region III  
1650 Arch Street  
Philadelphia, PA 19103-2029

- 3.5.4. **Certified emissions statement.** The permittee shall submit a certified emissions statement and pay fees on an annual basis in accordance with the submittal requirements of the Division of Air Quality. A receipt for the appropriate fee shall be maintained on the premises for which the receipt has been issued, and shall be made immediately available for inspection by the Secretary or his/her duly authorized representative. The certified emissions statement and pay fees are to be submitted on July 1 of each year unless directed by DAQ.  
[45CSR§30-8.]
- 3.5.5. **Compliance certification.** The permittee shall certify compliance with the conditions of this permit on the forms provided by the DAQ. In addition to the annual compliance certification, the permittee may be required to submit certifications more frequently under an applicable requirement of this permit. The annual certification shall be submitted to the DAQ and USEPA on or before March 15 of each year, and shall certify compliance for the period ending December 31. The permittee shall maintain a copy of the certification on site for five (5) years from submittal of the certification.  
[45CSR§30-5.3.e.]
- 3.5.6. **Semi-annual monitoring reports.** The permittee shall submit reports of any required monitoring on or before September 15 for the reporting period January 1 to June 30 and March 15 for the reporting

period July 1 to December 31. All instances of deviation from permit requirements must be clearly identified in such reports. All required reports must be certified by a responsible official consistent with 45CSR§30-4.4.

**[45CSR§30-5.1.c.3.A.]**

3.5.7. **Emergencies.** For reporting emergency situations, refer to Section 2.17 of this permit.

3.5.8. **Deviations.**

a. In addition to monitoring reports required by this permit, the permittee shall promptly submit supplemental reports and notices in accordance with the following:

1. Any deviation resulting from an emergency or upset condition, as defined in 45CSR§30-5.7., shall be reported by telephone or telefax within one (1) working day of the date on which the permittee becomes aware of the deviation, if the permittee desires to assert the affirmative defense in accordance with 45CSR§30-5.7. A written report of such deviation, which shall include the probable cause of such deviations, and any corrective actions or preventative measures taken, shall be submitted and certified by a responsible official within ten (10) days of the deviation.
2. Any deviation that poses an imminent and substantial danger to public health, safety, or the environment shall be reported to the Secretary immediately by telephone or telefax. A written report of such deviation, which shall include the probable cause of such deviation, and any corrective actions or preventative measures taken, shall be submitted by the responsible official within ten (10) days of the deviation.
3. Deviations for which more frequent reporting is required under this permit shall be reported on the more frequent basis.
4. All reports of deviations shall identify the probable cause of the deviation and any corrective actions or preventative measures taken.

**[45CSR§30-5.1.c.3.C.]**

b. The permittee shall, in the reporting of deviations from permit requirements, including those attributable to upset conditions as defined in this permit, report the probable cause of such deviations and any corrective actions or preventive measures taken in accordance with any rules of the Secretary.

**[45CSR§30-5.1.c.3.B.]**

c. Every report submitted under this subsection shall be certified by a responsible official.

**[45CSR§30-5.1.c.3.D.]**

3.5.9. **New applicable requirements.** If any applicable requirement is promulgated during the term of this permit, the permittee will meet such requirements on a timely basis, or in accordance with a more detailed schedule if required by the applicable requirement.

**[45CSR§30-4.3.h.1.B.]**

### 3.6. Compliance Plan

3.6.1. None

### 3.7. Permit Shield

3.7.1. The permittee is hereby granted a permit shield in accordance with 45CSR§30-5.6. The permit shield applies provided the permittee operates in accordance with the information contained within this permit.

3.7.2. The following requirements specifically identified are not applicable to the source based on the determinations set forth below. The permit shield shall apply to the following requirements provided the conditions of the determinations are met.

|  |   |
|--|---|
| <b>45CSR14</b><br>(May 1, 1995)                              | Northwest Fuel Development, Inc. is not subject to 45CSR14 since NFDI reduced their electricity generation to 77% of their maximum capacity to maintain a NOx emissions limit below 250 TPY.  |
| <b>45CSR17</b><br>(August 31, 2000)                          | Northwest Fuel Development, Inc. is subject to 45CSR7 which exempts it from 45CSR17, To Prevent and Control Particulate Matter Air Pollution from Materials Handling, Preparation, Storage and Other Sources of Fugitive Particulate Matter, as stated in 45CSR§7-10.2.   |
| <del><b>45CSR27</b></del><br>(June 30, 2004)                 | Northwest Fuel Development, Inc. is not subject to 45CSR27 since NFDI equipment that processes the natural gas that is less than 5% benzene by weight, 45CSR§27-2.4.  |
| <b>45CSR33</b><br>(July 1, 2000)                             | Acid Rain Provisions and Permits does not apply to Northwest Fuel Development, Inc. because it is not considered a Title IV (Acid Rain) Source.   |
| <b>40 C.F.R. Part 72</b><br>(January 11, 1993)               | Acid Rain Program General Provisions does not apply to Northwest Fuel Development, Inc because it is not considered a Title IV (Acid Rain) Source.  |
| <b>40 C.F.R. Part 60 Subpart KKK</b><br>(January 20, 1984)   | National Standards of Performance for Equipment Leaks of VOC from Onshore Natural Gas Processing Plants. Northwest Fuel Development is not subject to KKK since NFDI does not extract natural gas liquids from the coal methane gas.  |
| <b>40 C.F.R. Part 63 Subpart HH</b><br>(June 17, 1999)       | MACT 40 C.F.R. Part 63 Subpart HH for National Emission Standards for Hazardous Air Pollutants from Oil and Natural Gas Production since Northwest Fuel Development is not a major source for HAP emissions.  |
| <b>40 C.F.R. Part 63 Subpart ZZZZ</b><br>(February 28, 2004) | MACT 40 C.F.R. Part 63 Subpart ZZZZ for National Emission Standards for Hazardous Air Pollutants for Reciprocating Internal Combustion Engines (RICE) does not apply to Northwest Fuel Development, Inc., since it produces less than 10 tons per year of a single HAP and less than 25 tons per year of any combination of HAPs. Also, Northwest Fuel Development is not a major source for HAP emissions. |

**4.1. Source-Specific Requirements [Eighteen Internal Combustion Engines [001-01 (N1), 001-0J (N2), 001-0K (N3), 001-0L (N4), 001-0M (N5), 001-0N (N6), 001-07 (N7), 001-08 (N8), 001-09 (N9), 001-0A (N10), 001-0B (N11), 001-0C (N12), 001-0D (N13), 001-0E (N14) 001-0F (N15), 001-0G (N16), 001-0H (N17), and 001-0I (N18)] and emission point ID (S-1)]**

**4.1. Limitations and Standards**

- 4.1.1. The permittee shall meet the specific hourly and annual emissions limits set forth in Appendix A of this permit. Any reference to an annual limit in this permit refers to any consecutive twelve- (12) month period.  
[45CSR13, R13-2148, A.1.]
- 4.1.2. This facility shall consist of eighteen (18) 454 CID Chevrolet internal combustion engines each connected directly to a 75 kW, 460 volt, 3-phase electric generator. The maximum design heat input (MDHI) of each engine shall not exceed 1.4 MM BTU/hr.  
[45CSR13, R13-2148, A.2.]
- 4.1.3. The exhaust from all eighteen (18) engines shall vent to a single combined 90-foot tall stack with a minimum outlet temperature of 483.5 °F, at full load conditions.  
[45CSR13, R13-2148, A.3.]
- 4.1.4. The maximum annual plantwide electricity generation shall not exceed 9,100,000 kWh.  
[45CSR13, R13-2148, A.4.]
- 4.1.5. The minimum daily average oxygen concentration in the exhaust gas shall be 5.5% by volume on a dry basis.  
[45CSR13, R13-2148, A.5.]
- 4.1.6. The minimum monthly average oxygen concentration in the exhaust gas shall be 6.0% by volume on a dry basis.  
[45CSR13, R13-2148, A.6.]
- 4.1.7. The permitted facility shall be constructed and operated in accordance with information filed in Permit Application R13-2148 and any amendments thereto. The Director may suspend or revoke a permit if the plans and specifications upon which the approval was based are not adhered to.  
[45CSR13, R13-2148, C.3.]
- 4.1.8. No person shall cause, suffer, allow, or permit emission of smoke and/or particulate matter into the open air from any fuel burning unit which is darker in shade or appearance than ten (10) percent opacity.  
[45CSR§2-3.1., 45CSR13, R13-2148, B.6.]
- 4.1.9. In the event of an unavoidable shortage of fuel having characteristics or specifications necessary for a fuel burning unit to comply with the visible emission standards set forth in Sections 4.1.8. [45CSR§2-3] or any emergency situation or condition creating a threat to public safety or welfare, the Director may grant an exception to the otherwise applicable visible emission standards for a period not to exceed fifteen (15) days, provided that visible emissions during the exception period do not exceed a maximum six (6) minute average of thirty (30) percent and that a reasonable demonstration is made by the owner or operator that the emission standards under 45CSR§2-4 will not be exceeded during the exemption period.  
[45CSR§2-10.1.]

- 4.1.10. The Maximum Allowable Emission Rate of sulfur dioxide that can be emitted into the open air from the eighteen engines is 80.64 lb/hr = 3.2 x 18 Units x 1.4 MMBtu/hr per Unit.  
**[45CSR§§10.3.3. and 10-3.3.f., 45CSR13, R13-2148, B.7.]**
- 4.1.11. Compliance with the allowable sulfur dioxide emission limitations from fuel burning units shall be based on a continuous twenty-four (24) hour averaging time. The owner and/or operator of a fuel burning unit shall not allow emissions to exceed the weight emissions standards for sulfur dioxide as set forth in 45CSR10, except during one (1) continuous twenty-four (24) hour period in each calendar month and during this one (1) continuous twenty-four hour period said owner and/or operator shall not allow emissions to exceed such weight emission standards by more than ten percent (10%) without causing a violation of this rule. A continuous twenty-four (24) hour period is defined as one (1) calendar day.  
**[45CSR§10-3.8.]**
- 4.1.12. Due to unavoidable malfunction of equipment or inadvertent fuel shortages, emissions exceeding those provided for in this rule may be permitted by the Director for periods not to exceed ten (10) days upon specific application to the Director. Such application shall be made within twenty-four (24) hours of the equipment malfunction or fuel shortage. In cases of major equipment failure or extended shortages of conforming fuels, additional time periods may be granted by the Director provided a corrective program has been submitted by the owner or operator and approved by the Director.  
**[45CSR§10-9.1.]**
- 4.1.13. No owner or operator subject to the provisions of 45CSR10 shall build, erect, install, modify or use any article, machine, equipment or process, the use of which purposely conceals an emission which would otherwise constitute a violation of an applicable standard. Such concealment includes, but is not limited to, the use of gaseous diluents to achieve compliance with a standard which is based on the concentration of a pollutant in the gases discharged to the atmosphere.  
**[45CSR§10-11.1.]**

## **4.2. Monitoring Requirements**

- 4.2.1. Compliance with the visible emission requirements of Section 4.1.8. [45CSR§2-3.1.] shall be determined in accordance with 40 C.F.R. Part 60, Appendix A, Method 9 or by using measurements from continuous opacity monitoring systems approved by the Director. The Director may require the installation, calibration, maintenance and operation of continuous opacity monitoring systems and may establish policies for the evaluation of continuous opacity monitoring results and the determination of compliance with the visible emission requirements of Section 4.1.8. [45CSR§2-3.1.]. Continuous opacity monitors shall not be required on fuel burning units which employ wet scrubbing systems for emission control.  
**[45CSR§2-3.2.]**
- 4.2.2. Visible emission observations shall be conducted monthly by a certified Method 22 observer during periods of normal operation for a sufficient time interval to determine if the unit or units have visible emissions. If the source has visible emissions, then a 40 CFR 60, Appendix A, Method 9 evaluation shall be conducted within twenty four (24) hours unless the permittee can demonstrate a valid reason that the time frame should be extended. A Method 9 evaluation shall not be required if the condition resulting in the excess visible emissions is corrected within 24 hours and the units are operated at normal operating conditions.  
**[45CSR§30-5.1.c.]**

### 4.3. Testing Requirements

- 4.3.1. For purposes of determining compliance with the specific emission limitations set forth in Appendix A of this permit, unless the Director approves an alternate or equivalent method in writing, the following test methods of 40 C.F.R. Part 60, as appearing in Appendix A thereof, shall be utilized:

| <u>Pollutant</u>   | <u>Method</u>  |
|--------------------|--|
| Carbon Monoxide    | 40 C.F.R. Part 60 - Appendix A Method 10   |
| Hydrocarbons/VOCs  | 40 C.F.R. Part 60 - Appendix A Method 18   |
| Nitrogen Oxides    | 40 C.F.R. Part 60 - Appendix A Method 7  |
| Opacity            | 40 C.F.R. Part 60 - Appendix A Method 9  |
| Particulate Matter | 40 C.F.R. Part 60 - Appendix A Method 5<br>(front and back halves of sampling train) |
| Sulfur Dioxide     | 40 C.F.R. Part 60 - Appendix A Method 6  |
| Acetaldehyde       | 40 C.F.R. Part 60 - Appendix A Method 18   |
| Acrolein           | 40 C.F.R. Part 60 - Appendix A Method 18   |
| Benzene            | 40 C.F.R. Part 60 - Appendix A Method 18   |
| Formaldehyde       | 40 C.F.R. Part 60 - Appendix A Method 18   |
| Naphthalene        | 40 C.F.R. Part 60 - Appendix A Method 18   |
| Toluene            | 40 C.F.R. Part 60 - Appendix A Method 18   |
| Xylene             | 40 C.F.R. Part 60 - Appendix A Method 18   |

**[45CSR13, R13-2148, B.4.]**

- 4.3.2. The permittee shall conduct stack testing at maximum operating conditions and at seventy percent of maximum operating conditions to determine compliance with the Nitrogen Oxides and Carbon Monoxide emission limits set forth in this permit during the fifth year of operation of this facility. One representative engine may be chosen for testing, and used to base emissions estimates of the facility. All relevant process conditions shall be recorded at the time of testing, including a fuel quality analysis, the waste methane gas fuel feedrate per engine, electricity output per engine, exhaust gas temperature per engine, exhaust gas oxygen content per engine, and the exhaust gas moisture content per engine.

**[45CSR13, R13-2148, B.5.]**

### 4.4. Recordkeeping Requirements

- 4.4.1. To determine compliance with all permitted operating parameters identified in Sections 4.1.1. through 4.1.6. of this permit (e.g. exhaust gas oxygen content, electricity generation, etc.), the permittee shall maintain records including on a daily basis. Such records and supporting documentation must be maintained on-site for a minimum of five (5) years and be made available to the Director or his duly authorized representative upon request. A completed "Certification of Data Accuracy Form" must appear on the reverse side of each record, and accompany each submittal to the DAQ for each calendar quarter. Such recordkeeping shall be submitted to the DAQ within thirty (30) days of each calendar quarter. Appendix B shall be used as a minimum requirement for meeting this condition. The permittee may substitute equivalent certified forms if approved in writing by the DAQ (i.e. computer generated, existing forms with identical information) if so desired.

**[45CSR13, R13-2148, B.2.]**

- 4.4.2. The permittee shall maintain an onsite log of maintenance and operating activities of the eighteen (18) 454 CID Chevrolet engines for a minimum of five (5) years. This log shall be made available to the Director or his duly authorized representative upon request.

**[45CSR13, R13-2148, B.3.]**



## **5.0. Source-Specific Requirements [Diethanol Amine Unit (DEA) and Triethylene Glycol Unit (TEG) and emission point ID (DEA Stack and TEG Stack)]**

### **5.1. Limitations and Standards**

- 5.1.1. No person shall cause, suffer, allow or permit emission of smoke and/or particulate matter into the open air from any process source operation which is greater than twenty (20) percent opacity, except as noted in 45CSR§§7-3.2. [Section 4.1.2.], 3.3, 3.4, 3.5, 3.6, and 3.7.  
**[45CSR§7-3.1.]**
- 5.1.2. The provisions of Section 5.1.1. [45CSR§7-3.1.] shall not apply to smoke and/or particulate matter emitted from any process source operation which is less than forty (40) percent opacity for any period or periods aggregating no more than five (5) minutes in any sixty (60) minute period.  
**[45CSR§7-3.2.]**
- 5.1.3. Due to unavoidable malfunction of equipment, emissions exceeding those set forth in this rule may be permitted by the Director for periods not to exceed ten (10) days upon specific application to the Director. Such application shall be made within twenty-four (24) hours of the malfunction. In cases of major equipment failure, additional time periods may be granted by the Director provided a corrective program has been submitted by the owner or operator and approved by the Director.  
**[45CSR§7-9.1.]**
- 5.1.4. Maintenance operations (as defined in 45CSR7) shall be exempt from the provisions of 45CSR§7-4 provided that at all times the owner or operator shall conduct maintenance operations in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Director which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures and inspection of the source.  
**[45CSR§7-10.3.]**
- 5.1.5. An owner or operator may apply for an alternative visible emission standard for start-up and shutdown periods, on a case-by-case basis, by filing a written petition with the Director. The Director may approve an alternative visible emission standard for start-ups and shutdowns to the visible emission standard required under 45CSR§7-3. The petition shall include a demonstration satisfactory to the Director:
  - a. That it is technologically or economically infeasible to comply with 45CSR§7-3;
  - b. That establishes the need for approval of a start-up or shutdown plan based upon information including, but not limited to, monitoring results, opacity observations, operating procedures and source inspections.
  - c. That the particulate matter weight emission standards under section 4 are being met, as determined in accordance with 45CSR7A - "Compliance Test Procedures For 45CSR7 - 'To Prevent and Control Particulate Air Pollution From Manufacturing Process Operations'"; and
  - d. That during periods of start-ups and shutdowns the owner or operator shall, to the extent practicable, maintain and operate any manufacturing process including associated air pollution control equipment in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Director which may



include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures and inspection of the source.

**[45CSR§7-10.4.]**

- 5.1.6. The Maximum Allowable Emission Rate of sulfur dioxide that can be emitted into the open air from the Diethanol Amine Unit Reboiler is 1.92 lb/hr = 3.2 x 0.600 MMBtu/hr and for the Triethylene Glycol Unit Reboiler is 0.39 lb/hr = 3.2 x 0.125 MMBtu/hr.

**[45CSR§§10.3.3. and 10-3.3.f., 45CSR13, R13-2148, B.7.]**

- 5.1.7. See Sections 4.1.11 to 4.1.13.

## **5.2. Monitoring Requirements**

- 5.2.1. The permittee shall conduct monitoring/Record Keeping/reporting as follows. [Not required for haulroads.]

- a. Visible emission observations shall be conducted monthly by an observer during periods of normal operation for a sufficient time interval to determine if any of the emission units listed above or emission points have visible emissions and if so, the opacity of the emissions. If any of the emission units listed above or emission points have visible emissions exceeding the regulatory limit of twenty percent (20%) opacity, then a 45CSR7A evaluation shall be conducted immediately after the violation of the regulatory limit unless the permittee can demonstrate a valid reason that the time frame should be extended. A 45CSR7A evaluation shall not be required if the condition resulting in the excess visible emissions is corrected within 24 hours and the units are operated at normal operating conditions.
- b. A record of each visible emissions observation shall be maintained, including any data required by 40 C.F.R. 60 Appendix A, Method 22, whichever is appropriate. The record shall include, at a minimum, the date, time, name of the emission unit, the applicable visible emissions requirement, the results of the observation, and the name of the observer. Records shall be maintained on site for a period of no less than five (5) years stating any maintenance or corrective actions taken as a result of the weekly inspections, and the times the fugitive dust control system(s) are inoperable and any corrective actions taken.

**[45CSR§30-5.1.c.]**

## **5.3. Testing Requirements**

- 5.3.1. At such reasonable times as the Director may designate, the operator of any manufacturing process source operation may be required to conduct or have conducted stack tests to determine the particulate matter loading in exhaust gases. Such tests shall be conducted in such manner as the Director may specify and be filed on forms and in a manner acceptable to the Director. The Director, or his duly authorized representative, may at his option witness or conduct such stack tests. Should the Director exercise his option to conduct such tests, the operator will provide all the necessary sampling connections and sampling ports to be located in such manner as the Director may require, power for test equipment and the required safety equipment such as scaffolding, railings and ladders to comply with generally accepted good safety practices.

**[45CSR§7-8.1.]**

- 5.3.2. The Director, or his duly authorized representative, may conduct such other tests as he or she may deem necessary to evaluate air pollution emissions.

**[45CSR§7-8.2.]**

## **Appendix A**

### **Maximum Hourly and Annual Emissions Limits for R13-2148 Northwest Fuel Development, Inc. Federal No. 2 Mine - Parrish Shaft Crossroads, WV**

| Maximum Hourly Emissions (lb/hr)            |                 |         |                 |             |         |        |
|---|-----------------|---------|-----------------|-------------|---------|--------|
| Engine ID                                   | NO <sub>x</sub> | CO      | SO <sub>2</sub> | PM          | PM10    | VOC    |
| N1  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N2  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N3  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N4  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N5  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N6  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N7  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N8  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N9  | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N10   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N11   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N12   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N13   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N14   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N15   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N16   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N17   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| N18   | 4.11            | 0.29    | 0.20            | 0.01        | 0.01    | 0.16   |
| <b>Total (lb/hr):</b>                       | 73.91           | 5.29    | 3.63            | 0.18        | 0.18    | 2.92   |
| Maximum Annual Plantwide Emissions (ton/yr) |                 |         |                 |             |         |        |
|   | NO <sub>x</sub> | CO      | SO <sub>2</sub> | PM          | PM10    | VOC    |
|   | 249.1           | 17.84   | 12.24           | 0.80        | 0.80    | 6.47   |
| VOC-HAPs (ton/yr)                           |                 |         |                 |             |         |        |
| Acetaldehyde                                | Acrolein        | Benzene | Formaldehyde    | Naphthalene | Toluene | Xylene |
| 0.338                                       | 0.094           | 0.265   | 2.590           | 0.008       | 0.092   | 0.026  |

## **Appendix B**

**Northwest Fuel Development, Inc.  
Federal No. 2 Mine - Parrish Shaft Crossroads, WV**

**Minimum Recordkeeping for R13-2148  
Recordkeeping of Daily Plantwide Electricity Generation and Average Daily  
Exhaust Gas Oxygen Content**

| Month:                 |                            | Year:  |
|------------------------|----------------------------|--|
| Day                    | Electricity Generated (kW) | Minimum Exhaust Gas Oxygen Concentration<br>Average Daily Percent Oxygen   |
| <b>R13-2148 Limit:</b> | <b>9,100,000 kWh/yr</b>    | <b>5.5 percent minimum average daily oxygen concentration<br/>6.0 percent minimum average monthly oxygen concentration</b> |
| 1                      |                            |  |
| 2                      |                            |  |
| 3                      |                            |  |
| 4                      |                            |  |
| 5                      |                            |  |
| 6                      |                            |  |
| 7                      |                            |  |
| 8                      |                            |  |
| 9                      |                            |  |
| 10                     |                            |  |
| 11                     |                            |  |
| 12                     |                            |  |
| 13                     |                            |  |
| 14                     |                            |  |
| 15                     |                            |  |
| 16                     |                            |  |
| 17                     |                            |  |
| 18                     |                            |  |
| 19                     |                            |  |
| 20                     |                            |  |
| 21                     |                            |  |
| 22                     |                            |  |
| 23                     |                            |  |
| 24                     |                            |  |
| 25                     |                            |  |
| 26                     |                            |  |
| 27                     |                            |  |
| 28                     |                            |  |
| 29                     |                            |  |
| 30                     |                            |  |
| 31                     |                            |  |
|                        |                            | = Total Plantwide Electricity Generation (kW)  |
|                        |                            | = Monthly Average Minimum Exhaust Gas Oxygen Concentration   |

Complete the Certification of Data Accuracy Form found on the back of this page.

## CERTIFICATION OF DATA ACCURACY

I, the undersigned, hereby certify that all information contained in the attached \_\_\_\_\_, representing the period beginning \_\_\_\_\_ and ending \_\_\_\_\_, and any supporting documents appended hereto, is true, accurate, and complete based on information and belief after reasonable inquiry.

Name (Type or Print): \_\_\_\_\_

Signature<sup>1</sup>: \_\_\_\_\_

Title: \_\_\_\_\_

Date: \_\_\_\_\_

Telephone No.: \_\_\_\_\_

Fax No.: \_\_\_\_\_

\_\_\_\_\_  
<sup>1</sup>This form shall be signed by a "Responsible Official". "Responsible Official" means one of the following:

- a. For a corporation: the president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision-making functions for the corporation, or a duly authorized representative of such person if the representative is responsible for the overall operation of one or more manufacturing, production, or operating facilities applying for or subject to a permit and either (i) the facilities employ more than 250 persons or have a gross annual sales or expenditures exceeding \$25 million (in second quarter 1980 dollars), or (ii) the delegation of authority to such representative is approved in advance by the Chief;
- b. For a partnership or sole proprietorship: a general partner or the proprietor, respectively;
- c. For a municipality, State, Federal, or other public entity: either a principal executive officer or ranking elected official. For the purposes of this part, a principal executive officer of a Federal agency includes the chief executive officer having responsibility for the overall operations of a principal geographic unit of the agency (e.g., a Regional Administrator of U.S. EPA); or
- d. The designated representative delegated with such authority and approved in advance by the Chief.